

the device can be powered by AC current, DC current, or battery;

a power connection on the device for connection with an outside power source;

a transformer in the device for reduction said outside power source to provide the appropriate current to power or charge the wireless communication device;

a system to terminate charging of the batteries of the wireless communication device when said device is fully charged if the wireless communication device has batteries;

a self contained power source for the device which can power the device when it is not connected to an external power source

Description

BACKGROUD OF THE DEVICE

1. Field of the Invention

The present device relates to a wireless communication device such as a wireless phone, portable computer, handle held or portable wireless communication device, and in particular, to an alerting method and apparatus for alerting a user by sound, light or display to signal a message arrival to the wireless communication device.

Mobil wireless communication devices use various methods to produce a signal of incoming message. Some may produce a sound signal, vibrate or use visual means to notify the user. As the wireless communication devices have achieved widespread use, and have become important for many as their primary communication method of communication. Therefore the importance of being aware of incoming messages from their mobile wireless communication devices has increased and the production a signal which will notify the user who is not in close proximity to the wireless communication device is necessary.

SUMMARY OF THE DEVICE

The present device is to provide an alerting method for a wireless communication device which will generate a notification by audio or visual signal, which can be heard or seen from greater distance or for a longer time than the alerting signal generated by the wireless communication device.

Another objective of the present device is to provide power to both recharge the internal power supply of the wireless communication device and also power the wireless communication device while it is attached to the device. The device will either be powered by an external power supply such as AC or DC current or by internal battery. The device will alter these power sources to the proper voltage and amperage need by the attached wireless communication device.

The device will receive the incoming message signal from the wireless communication device by one of the following methods: (a) A microphone attached to the device will receive the signal from the wireless communication device for the device; or (b) the wireless communication device can be directly attached to the device by a plug, pin wire, contact connection, optical connection, or non-contact low-power signal connection or radio wave to make a "attachment" to the device.

The device will be signaled by the wireless communication device when a message is incoming. This signal will be amplified by the device and then broadcast by the device by the method or methods chosen by the user either audio, visual or both. The signal generated by the device may be the same as the wireless communication device, or a different signal produced by the device. The device may also repeat the broadcast of the signal, at a predetermined rate, after the wireless communication device has ceased its signal.

The device will have a signal light which will alert of a message. This light either may stay on or flash until the message of the wireless communication device has been answered.

The device may also have a display which will either display information generated by the wireless communication device, or a message generated by the device.

The device will contain a switch to terminate the audio and/or visual signal of the device.

The device will have a signal light to indicate the wireless communication device is properly attached to the device.

The device will signal by light when the wireless communication device is being charged by the and also when the wireless communication device is full charged and the charging has ceased.

BRIEF DESCRIPTION OF THE DRAWING

With reference now the drawing of a new method of indication of incoming message on a mobile wireless communication device. More specifically, referring to FIG. 1, it will be noted that the first embodiment of the device includes a housing 20. A connection 13 to an outside power source such as AC or DC current connects to a transformer 14 which will power both the device and charge the wireless communication device. A battery 10 may also be attached to the device to power either the device or wireless communication device. The battery may be either disposable or rechargeable. A controller 16 will stop charging the wireless communication device when its power source is fully charged. A light 15 will indicate when the device has power. A light 4 will signal when the wireless communication device is properly attached to the device and is being powered by the device or charging its power source. A light 5 will indicate the wireless communication device is charging. The wireless communication device will be docked 11 to the ~~invention~~ device to transfer a signal to indicate an incoming message to the ~~invention~~ device. The wireless communication device will also be attached 12 to the ~~invention~~ device to transfer power to the wireless communication device. A microphone 7 may also be attached to the device this shall be used to receive an audio signal generated from the wireless communication device if the wireless communication device is not able to connect to the device to transfer a signal indicating a message. The signal from the microphone or the signal directly from the wireless communication device will go to amplifier 17 which will transmit a signal to the speaker 1. This microphone may also be used to transfer audio signals to the wireless communication device. The device may use

any or all of the following methods to indicate an incoming message. The speaker 1 will transmit an audio alert produced by the synthesizer 21 or be used to amplify the audio of the wireless communication device. The speaker volume will be regulated by a controller 3 on the device. A device to produce a ringer tone 9 will be connected to a timer 8 which will be used to control the repetition of the signal which was selected to indicate a message present. A display 2 can be used to indicate a message is present and will produce a visual signal generated from the device by the audio, video, graphic control unit 18, if the visual signal from the wireless communication device is not selected. A signal light 6 will also be used to indicated a message was received by the wireless communication device. An on/off switch 19 will be on the device to power the device on or off.

With respect to the above description then, it is to realized that the optimum dimensional relationships for the parts of the device, to include variations in size, materials, shape, form, function and manner of operation, assembly and use, are deemed readily apparent and obvious to one skilled in the art, and all equivalent relationships to those illustrated in the drawings and described in the specification are intended to be encompassed by the present device. Therefore, the foregoing is considered as illustrative only of the principles of the device. Given the speed at which semiconductor , electronics and software technology is progressing, the preceding is a description of the preferred embodiment of my inventive system which I contemplate will be implemented with the most technical and cost effective technology available at the time it is used for a particular application. Further, since numerous modifications and changes will readily occur to those skilled in the art, it is not desired to limit the device to the exact construction and operation shown and described, and accordingly, all suitable modifications and equivalents may be resorted to falling within the scope of the device.
